

Date: Tue, 13 Sep 94 04:30:34 PDT
From: Ham-Homebrew Mailing List and Newsgroup <ham-homebrew@ucsd.edu>
Errors-To: Ham-Homebrew-Errors@UCSD.Edu
Reply-To: Ham-Homebrew@UCSD.Edu
Precedence: Bulk
Subject: Ham-Homebrew Digest V94 #272
To: Ham-Homebrew

Ham-Homebrew Digest Tue, 13 Sep 94 Volume 94 : Issue 272

Today's Topics:

 100MHz TTL Clock
 [Q] Suggestions for remo
 CD40175 source ? (2 msgs)
 CW keys for portable operation
 EME amp
 Ham-Homebrew Digest V94 #270
 RE 100 MHz TTL Clock
 SWR meter suggestions?

Send Replies or notes for publication to: <Ham-Homebrew@UCSD.Edu>
Send subscription requests to: <Ham-Homebrew-REQUEST@UCSD.Edu>
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Ham-Homebrew Digest are available
(by FTP only) from UCSD.Edu in directory "mailarchives/ham-homebrew".

We trust that readers are intelligent enough to realize that all text
herein consists of personal comments and does not represent the official
policies or positions of any party. Your mileage may vary. So there.

Date: Tue, 13 Sep 1994 04:10:36 GMT
From: ihnp4.ucsd.edu!agate!howland.reston.ans.net!usc!nic-nac.CSU.net!
charnel.ecst.csuchico.edu!rat!zeus!rheiss@network.ucsd.edu
Subject: 100MHz TTL Clock
To: ham-homebrew@ucsd.edu

In article <2E6F304A@msmail.uthscsa.edu> MUENZLERK@uthscsa.EDU (Muenzler, Kevin)
writes:

>If you just need a 100MHz pulse rate, you can use any of the
>74Fxx or 74ALSxx series chips. They should have no problem
>running at 100MHz. All you would need is the 100 MHz
>crystal. You can use the 74ALS00 (quad nand gate) chip
>and the 100MHz crystal as an oscillator.

All you need ... no problem? ;-)

See also comp.sys.mac.hardware and comp.sys.powerpc on the subject of crystal oscillators. To help kids hot-rod their computers (an application I do NOT recommend) there are several retail suppliers.

Date: Sat, 10 Sep 94 22:41:00 -0400
From: ihnp4.ucsd.edu!newshub.nosc.mil!crash!news.sprintlink.net!ns.channel1.com!
channel1!alan.wilensky@network.ucsd.edu
Subject: [Q] Suggestions for remo
To: ham-homebrew@ucsd.edu

AT>OK, here's the situation:
AT>I have a 486 running Linux, zyxel modem, etc.
AT>I like to have my machine up all the time for my answering machine
AT>software, dialin access, etc.
AT>I'm somewhere else and I know there's a lightning storm heading
AT>towards my computer.

AT>What I'd like to be able to do:
AT>Switch off my machine remotely by having the computer cut power to
AT>its own power bar via a serial port or some other digital signal from
AT>my computer (ie after killing processes and syncing filesystems).

AT>The software side is trivial. Just have my voice/fax software run a
AT>script on some command. When the system halts or power goes down, the
AT>phone line will automatically go back on hook. And no, my machine is
AT>not a sentient lifeform! :-)

AT>Gravy:
AT>It would be nice to be able to specify a time duration after which
AT>the system will automatically revive itself. This is not critical and
AT>I figure I can work this out myself.

AT>QUESTION(S):
AT>Has someone built such a device?
AT>What sorts of relays/switches could I consider using?
AT>Would the bouncing of (say)relay contacts pose their own problems
AT>like spikes to the computer?
AT>Perhaps it's safer(regulation-wise) and simpler to just have a
AT>mechanical device with solenoids sit on top of the powerbar's rocker
AT>switch? It just doesn't seem elegant.
AT>What about other lightning-safe concerns?

AT>I'm not looking for something that will survive a direct hit on a
AT>house with the resultant charge arcing across all the open switches.
AT>Just something reasonably cheap, simple, and effective for the

AT>usual lightning-induced power fluctutations.

There is a little box that you can but that lets you call in by phone and power off/on the computer. Sold by several companies. Look in Byte Mag.

Alan Wilensky, N1SS0
abm@world.std.com

* CmpQwk #UNREG* UNREGISTERED EVALUATION COPY

Date: Sun, 11 Sep 1994 08:58:38 +0000
From: news.sprintlink.net!demon!lfheller.demon.co.uk!Leon@uunet.uu.net
Subject: CD40175 source ?
To: ham-homebrew@ucsd.edu

In article <rvmeush-1009940944540001@rvmeush_ppp.clark.net>
rvmeush@clark.net "Robert V. Meushaw" writes:

[stuff deleted]

> Also, is there a newsgroup dedicated to electronics in general?
>
> Bob Meushaw
>

Yes, sci.electronics.

Leon

--

Leon Heller, G1HSM
E-mail: leon@lfheller.demon.co.uk
Tel: +44 (0)734 266679

Date: Sat, 10 Sep 1994 09:44:54 -0500
From: news.sprintlink.net!news.clark.net!rvmeush_ppp.clark.net!user@uunet.uu.net
Subject: CD40175 source ?
To: ham-homebrew@ucsd.edu

I am trying to find a good inexpensive mailorder source for CD40175 parts. I have checked DigiKey and Jameco. Also I don't think they are carried by Mouser. Any info appreciated.

Also, is there a newsgroup dedicated to electronics in general?

Bob Meushaw

Date: Sun, 11 Sep 1994 01:57:00 +0000
From: ihnp4.ucsd.edu!newshub.nosc.mil!crash!news.sprintlink.net!demon!
arkas.demon.co.uk!Michael@network.ucsd.edu
Subject: CW keys for portable operation
To: ham-homebrew@ucsd.edu

OK - I'm not homebrewing a key, but I am looking to homebrew a "low parts count" portable transceiver. I wish to use cw, but am not interested in dragging the MK2 8 Amp key around with me on portable ops!

I've seen small keys on military gear ... but not at all in the surplus vendors that I have access to. (I think they get snapped up at a lightning-like rate once they appear in the surplus store!) I know of a good key that is part of the AN-PRC/VRC 47 set kit -it has a clip that allows the operator to sit down and fasten the key to his/her leg. It's slightly heavier than I would want (so's the 47 set!) and a smaller key would be good. The other alternative is a small dual paddle unit -the Bencher paddles are good in shacks but are too heavy and too nice to put in a rucksack, I think.

Does anyone one know of manufacturers / retailers that sell small, lightweight keys / paddles that would be useful in my desired application?

Replies ok either here (rec.radio.amateur.homebrew) or email to michael@arkas.demon.co.uk

TIA & 73's

--

Mike Dower

G0VEY

VK2ENG

'Quoth the raven, "Never more".' ... Poe

Date: 12 Sep 94 13:05:31 GMT
From: news-mail-gateway@ucsd.edu
Subject: EME amp
To: ham-homebrew@ucsd.edu

Harry, W3IIT wrote:

>To: ham-homebrew@ucsd.edu

>I've heard that Russian tubes are available. Does anyone have info

>(costs, types, where) in the US?

>73, Harry, W3IIT
>hbrown@resd.vf.ge.com

try: Svetlana Electron Devices, Inc. > low cost 4CX800A
ATTN: George Badger, W6TC > contact George
3000 Alpine Rd. > for pricing.
Portola Valley, CA 94028 >

co-founder: _\\//_ _
(' 0 0 ') North East Weak Signal group, ARRL affil.
-----oo0-()-0oo-----
| 73 de Ron WZ1V, email: klimas%uhavax.dnet@ipgate.hartford.edu |
Grid FN31mp BBS: 203-768-4758 (weeknights/weekends only)

Date: 12 Sep 94 19:38:48 GMT
From: news-mail-gateway@ucsd.edu
Subject: Ham-Homebrew Digest V94 #270
To: ham-homebrew@ucsd.edu

Subject: Freq. Counter Problem
ref ham-homebrew digest v94-*270

> I have an older model tube general
> receiver with analog tuning. To improve my tuning accuracy I
> hooked up a frequency counter by taking a tap from the oscillator
> plate line using a 1 uf 1 kv capacitor. The lead was sent to the
> frequency meter and the ground of the meter was connected to the
> ground of the radio. This arrangement works exceptionally well
> (7 decimal place accuracy, as long as I remember to subtract the
> oscillator's frequency from the meter reading) except on 3.3 to
> 5.6 MHz, where I get no reading on the meter. However the
> oscillator is obviously working since I tune in stations
> effectively and the analog frequency reading appears to
> correspond to the stations' announced frequencies.

> Could anyone hazard a guess as to why the anomaly for 3.3 to 5.6
> MHz?

> Thanks for any suggestions.

> Regards,
> Jack

Since the signal coupled into the freq counter is frequency
dependent You are probably see the practical proof of ac transfer

thru a capacitor! You have less drive for the freq counter as
the frequency is dropped.

73, K5VMU ,Plano,TX | Opinions expressed are mine alone: Rockwell
dale_croft@comsys.rockwell.com | does not acknowledge nor endorse them!

Date: 12 Sep 94 14:21:00 GMT
From: news-mail-gateway@ucsd.edu
Subject: RE 100 MHz TTL Clock
To: ham-homebrew@ucsd.edu

in digest 269 Fred (K4DII) writes:

>In article <2E6F304A@msmail.uthscsa.edu>, MUENZLERK@uthscsa.EDU (Muenzler,
>Kevin) wrote:
>> If you just need a 100MHz pulse rate, you can use any of the
>> 74Fxx or 74ALSxx series chips. They should have no problem
>> running at 100MHz. All you would need is the 100 MHz
>> crystal.
>
>Kevin-
>
>A 100 MHz crystal is most likely used in a fifth or seventh overtone
>mode. How do you ensure that the crystal oscillates at the correct
>overtone, instead of the fundamental or an "easier" overtone?
>
>73, Fred, K4DII

Well Fred,
I didn't really consider that. You are probably right. I guess one
could use an overtone oscillator or harmonic oscillator, amplify the
output to a level that TTL would see and then run it through a TTL gate
such as 74ALS00 or 74ALS04 for shaping.

Kevin

Legal stuff:

The above opinions are my own and not necessarily those of the staff,
faculty, administration, or lab animals (woof!) of The University of
Texas Health Science Center at San Antonio or anyone else who is not
me.

Kevin R. Muenzler, WB5RUE The University of Texas Health

muenzlerk@uthscsa.edu

Science Center at San Antonio,
Department of Computing Resources

** There is no such thing as a Monkey-Proof Program! **
** I can prove it! **

| I am Voltohm of Borg!
| Resistance is E/I!
| Power is EI!

Date: Sat, 10 Sep 1994 18:16:03 GMT

From: ihnp4.ucsd.edu!newshub.nosc.mil!crash!nctams1!pnet16!n921w1@network.ucsd.edu

Subject: SWR meter suggestions?

To: ham-homebrew@ucsd.edu

Guy: Thres is a nice article in on old QST Dec 90 page 24 thru 26 that will probaly fit your needs. It's easy only have to come with a 0-100uA meter may find at ye old Radio shack near you..good luck with the project.
AH6IN Chuck Aloha

INET: n921w1@pnet16.navy.mil

End of Ham-Homebrew Digest V94 #272
